

Aboveground Storage Tank Removal IFC Permit Application Requirements 2010

Fees: The fees listed are valid through **December 31, 2010**. The next fee adjustment will be effective January 1, 2011.

First tank.....\$261
Each additional tank.....\$183

(Note: Plan review included in the price of the permit.)

The following information is required to be submitted along with the City of Woodinville Aboveground Storage Tank Removal permit application. **Application must be complete.**

The shaded area indicates the minimum information required for permit application acceptance by the City of Woodinville Permit Center. Final approval of permit will require that all information be provided, as applicable.

- Contractor's IFCI certification for removal, or other acceptable certification, the Site supervisor (State) information.
- A "Site specific safety and health plan" as required by CFR 29.1910.120.
- A notarized Labor & Industries Contractor's license is required.
- The final disposal location.
- 3 copies of site plans showing any tanks relative to location of other buildings, roadways, utilities.

For permit approval show the following:

1. Elimination of all sources of ignition:
 - a. Smoking, internal combustion engines, etc.
 - b. Static electricity sources
 - c. Accumulation of explosive vapors at ground level.
2. Safety features required:
 - a. Hard hats for all on-site workers
 - b. The proper number and type of respirators
3. Combustible gas indicator (CGI) is used to check for hazardous vapor concentrations.
4. No "Hot" work will be allowed unless a "Certified Marine Chemist" certifies tank(s) are gas free.

5. Vapor hazard area is to be cordoned off in an approved manner.
6. Vapor hazard area is to have sufficient 40 BC dry chem. Extinguishers.
7. All open flame and spark-producing equipment within the vapor hazard area shall be shut down. Electrical equipment used in the area must be explosion-proof in accordance with NFPA 70BC Class I, Division I, Group D or otherwise approved for use in potentially explosive atmospheres.
8. Lock out/ Tag out (power is off to tanks)
9. Product piping is drained into the tank with piping capped or removed.
10. Remove liquids and residues from the tank by using explosion-proof or air driven pumps. Pump motors and hoses shall be grounded. If vacuum truck is used, the area of operation for the truck must be vapor-free. The truck shall be located upwind from the tank and outside the path of probable vapor travel.
11. Remove flammable vapors in the following manner:
 - a. Vent all vapors from the tank at a minimum height of 12 feet above grade and 3 feet above an adjacent roof line.
 - b. Purge vapors with an inert gas such as (CO₂) or (N₂) this method is not to be introduced through a single tank opening at a point near the bottom of the tank at the end of the tank opposite the vent and introduced under low pressure to avoid the generation of static electricity. (Caution: the discharging device must be grounded because of the potential build up of static electricity. CO₂ extinguishers should not be used for inerting flammable atmospheres.
 - c. Adding solid carbon dioxide (dry ice) to the tank at least 1.5 lbs per 100 gallons of tank capacity. The dry ice should be crushed and distributed evenly over the greatest possible area in the tank. Make sure that all of the dry ice has evaporated before proceeding.
 - d. Ventilation using an educator-type mover. An educator extension shall be used to discharge vapors a minimum of 12 feet above grade and 3 feet above adjacent roof lines.
 - e. Ventilation with a diffused air blower. The air-diffusing pipe is properly bonded to prevent the discharge of a spark.
 - f. Fill the tank with water.
 - g. Steam can be used to purge a tank. Be sure the steam discharge nozzle and all conductive insulated objects subject to condensation are bonded to the tank or grounded. Steam purging of tanks should be avoided when suitable alternatives are available.
12. After the tank has been purged of vapors and before it is removed from the excavation, plug or cap all accessible holes. One plug should have a 1/8-inch to

1/4-inch vent hole to prevent the tank from being subjected to excessive differential pressure caused by temperature changes.

13. Tanks shall be labeled prior to removal from the site. The label should state the former contents and present vapor state of each tank, including vapor-freeing treatment and date. The label should be in legible letters at least 2 inches high.
14. The tanks should be removed from the site as promptly as possible after vapor-freeing procedures have been completed.
15. Before the tank is removed from the site, the tank atmosphere should be checked with a combustible gas indicator as to ensure that does not exceed 20 percent of the lower flammable limit.
16. Soil samples shall be taken and sent to the proper authorities with results sent to Woodinville Fire and Life Safety District, Attn: FMO, P.O. Box 2200, Woodinville, WA 98072, no later than 30 days after tank removal.
17. Removal shall adhere to the IFC and other applicable standards.